South Carolina Vaccine Advisory Committee (VAC) Framework and Recommendations* for COVID-19 Vaccine Allocation. Phase 1b

*This Phase 1b outline is a current recommendation by the South Carolina Vaccine Advisory Committee and has not yet been finalized or implemented as official Phase 1b guidance by DHEC or the state of South Carolina.

On December 20, the Advisory Committee for Immunization Practices (ACIP) voted to recommend prioritizing individuals 75 and older and frontline essential workers at increased risk for COVID-19 disease for Phase 1b.

Summary points

- Demand for COVID-19 vaccines is expected to exceed supply during the first months of the national COVID-19 vaccination program.
- Once DHEC has been allocated enough vaccine to vaccinate most of Phase 1a
 workers who will accept vaccine, DHEC will begin moving to Phase 1b. In
 some areas, vaccination in Phases 1a and 1b may take place at the same time
 depending on the amount of vaccine available and the level to which people
 choose to participate.
- Similarly, Phase 1c may begin before all persons in Phases 1a and 1b have been fully vaccinated if there is adequate vaccine to ensure all those in Phases 1a and 1b who want vaccine can get vaccinated.
- At any phase, persons may at first choose not to get vaccine and receive it at a later phase.
- Persons included in Phase 1b are
 - o Workers in health care settings not vaccinated in Phase 1a
 - Persons living and working in shared or overcrowded settings increasing risk of COVID-19 infection
 - Frontline essential workers (non-health care workers) who provide critical societal services with potential uncontrolled exposure to SARS-CoV-2, the virus that causes COVID-19 (expanded definition below)
- DHEC will issue guidance for determining unavoidable, substantially increased risk of exposure to SARS-CoV-2 in frontline essential services worksite settings
- Planning and decisions about COVID-19 vaccination may change as we learn more about the vaccines.

Examples

Persons living and working in shared or overcrowded settings increasing risk of COVID-19 infection

- Residents and workers in group home settings with behavioral or substance use disorder conditions or for the mentally or physically disabled not previously vaccinated in Phase 1a
- Workers and residents in homeless shelters
- Workers and residents in community training homes (CTHs)
- o Correctional facility officials with close inmate contact
- Correctional and immigration detention facility inmates
- Migrant farmworkers living in shared housing or using shared transportation
- Meat- and poultry packing workers or other industrial settings unable to keep distance at work
- Department of Agriculture meat/poultry inspectors

Frontline Essential Workers

- Public safety officers, firefighters not previously vaccinated in 1a.
- Frontline essential workers at highest risk for work-related exposure to SARS-CoV-2 who experience unavoidable, substantially increased risk of exposure to SARS-CoV-2
 - Food and agricultural workers
 - o U.S. Postal Service workers
 - Manufacturing workers
 - Grocery store workers
 - Public transit workers
 - Education sector (teachers and support staff members) and child-care workers

Background

With an overall goal of preventing deaths, Phase 1a focused on vaccinating workers in healthcare settings at increased risk for exposure to SARS-CoV-2 and those age 70 and older.

A primary goal in Phase 1b is preventing deaths and best distributing of a limited vaccine supply. Vaccination early in Phase 1b will focus on those at greatest risk of getting COVID-19 and those performing critical tasks in support of society who are at increased risk of contracting COVID-19 on their jobs. Once DHEC has been allocated enough vaccine to vaccinate most Phase 1a workers who will accept vaccine, DHEC will begin moving to Phase 1b. ACIP recommends transitioning to Phase 1b when \sim 70% of Phase 1a have been vaccinated. At any phase, persons may initially decide not to get the vaccine and receive it at a later

phase. Bulleted lists within each Phase are not in order of importance, but limited vaccine supply means that some groups may be vaccinated earlier if data indicate they are at higher risk.

ACIP used CISA (Cybersecurity and Infrastructure Security Administration) guidance to define frontline essential workers as the subset of essential workers likely at highest risk for work-related exposure to SARS-CoV-2, because their work-related duties must be performed on-site and involve being in close proximity (<6 feet) to the public or to coworkers. ACIP has classified the following non-health care essential workers as frontline workers: medical first responders (e.g., firefighters and police officers), corrections officers, food and agricultural workers, U.S. Postal Service workers, manufacturing workers, grocery store workers, public transit workers, and those who work in the education sector (teachers and support staff members) as well as child care workers

Nationally, large COVID-19 outbreaks have been reported in multiple essential industries including manufacturing, construction, wholesale trade, and animal slaughtering and processing. Factors like close working conditions, prolonged close contact with coworkers, crowded work-related housing, use of public or shared transportation by workers, and the need to hold multiple jobs contribute to outbreaks in these settings. Clusters of cases associated with school groups in SC may be related to the school setting or outside activities (e.g., sports, community gatherings). While there is limited vaccine supply, ACIP recommends considering:

- Workers in locations where high rates of transmission and/or outbreaks have occurred
- Workers who are at increased risk for severe illness based on age or underlying medical conditions
- Delay vaccination of individuals who have had COVID-19 until 90 days after initial symptoms and/or positive test

ACIP noted that jurisdictions may choose to vaccinate those living in congregate settings, such as prisoners and people in homeless shelters, in phase 1b

If enough vaccine is not available to cover all 1b recipients, those least able to protect themselves should be prioritized. The rate of COVID-19 infection and death varies geographically across the state with the highest rates in zip code areas with a high Social Vulnerability Index (SVI). How and where people live impacts risk for COVID-19 (e.g., living in households that include people of more than one generation, access to healthcare, ability to avoid workplace exposure, pre-existing medical conditions and other factors often associated with lower socio-economic status).

In addition to increased occupational exposure risks, some industry and occupation groups have high percentages of demographic groups (e.g., racial and ethnic

minorities and older workers) who experience a disproportionate burden of COVID-19-related morbidity and mortality.⁵ At least 15% of workers in the transit/postal/messenger/courier and trucking industries were >60 years.⁵ While Blacks comprise 12% of all workers, they are overrepresented in public transit (26%), child care/social services (19%), trucking/warehouse/Postal Service (18%), and grocery/convenience/drugstores (14%); Hispanics make up 17% of the workforce but are overrepresented in building cleaning services (40%), trucking/warehouse/Postal Service (20%), and grocery/convenience/drugstores (19%)

The risk of exposure in all communities must be addressed, especially communities with higher rates as compared to others. More intensive outreach will focus on these communities with mobile vaccination clinics, public education efforts, and communication via trusted sources such as faith-based community leaders, community health workers, fraternity and sorority outreach, and other trusted local organizations.

Frontline essential workers with uncontrolled exposure due to interactions with public:

- Public safety officers, firefighters not previously vaccinated in 1a
- Frontline workers in essential services at highest risk may be considered on a case-by-case basis.
 - It is recommended that workers in essential services at risk for severe COVID-19 because of age 65-74 years and/or who have medical conditions at increased risk for severe COVID-19 disease would be vaccinated earlier than younger workers with no existing medical conditions.

Rationale

Workers with frequent interaction with the public at a distance of <6 feet while performing essential societal services may be at increased risk. Loss of these services could interrupt vital community needs. The services performed are considered essential, but the individuals are not included in Phase 1a because they do not serve in a role to prevent severe disease and death from COVID-19.

Workers in high-risk settings in Phase 1b include:

- Hospital medical personnel, ancillary staff, EMS and hospital transport staff not previously vaccinated in Phase 1a
- Hospital volunteers, clergy, food/janitorial/environmental services staff who
 may be exposed to confirmed or suspect COVID-19 patients not previously
 vaccinated in Phase 1a
- Community health workers (CHWs) ho serve high-risk populations
- Persons administering vaccine (if not vaccinated in Phase 1a)
- Persons performing SARS-CoV-2 testing

Rationale

These workers have a higher risk than other community members because their jobs bring them into contact with someone who may be infected with the virus that causes COVID-19, or infected bodily fluids. They may work in marginalized communities, or have a higher risk because of shared living settings, limited ability to isolate and/or quarantine, work situations, and/or risk associated with poverty. Persons administering vaccine and performing SARS-CoV-2 testing are more likely to be exposed to workers in high-risk settings or suspected COVID-19 cases, respectively.

Those living and working in shared or overcrowded settings:

- Residents and workers in group home settings for the mentally or physically disabled or those with behavioral or substance abuse conditions
- Workers and residents in homeless shelters
- Workers and residents in community training homes (CTHs)
- Correctional facility officials with direct inmate contact
- Correctional and immigration detention facility inmates
- Migrant farmworkers living in shared housing or reliant on shared transportation
- Meat- and poultry packing workers or other industrial settings unable to keep distance at work
- Department of Agriculture meat/poultry inspectors

Rationale

With an overall goal of preventing deaths, consideration should be given to community settings where spread and resulting deaths are high, and situations where shares space increases contact with the virus and spreading it further. Outbreaks among workers in meat- and poultry-processing plants reflect space issues where workers cannot maintain 6-foot distance. Prisons. According to the UCLA COVID Behind Bars Project, as of 12/28/2020 there have been 2,454 confirmed COVID -19 cases among SC state prison inmates (13% cumulative case rate) and662 cases among prison staff

Workers with highly specialized skills and limited staffing

 Workers in roles like air traffic controllers and skilled workers in fixed nuclear facilities can be considered for vaccine in Phase 1b.

Rationale

Even temporary loss of these workers could hurt essential services.

Transition to next phase

Timing of transition from Phase 1a to 1b, and from 1b to 1c will be considered when:

- Demand in current phase is less than vaccination capacity
 - For example, begin transition when appointments for vaccine <80% filled for several days
- Supply increases substantially
- More doses available of current vaccines or new vaccine authorized
- Most persons within current phase vaccinated (~70%)

Persons NOT included in Phase 1b:

- Hospital staff who can avoid being close to a confirmed or suspect COVID-19 patient: administrators, all staff who can work from home, support staff and medical personnel working with confirmed SARS-CoV-2 negative patients.
- LTCF personnel not involved in direct resident care, e.g., administrators, those who can work from home.
- Age 65-69
- Essential services personnel who are not frontline (i.e., with potential or uncontrolled exposure to SARS-CoV-2)

Temporary residents in SC who fall into one the above categories for Phase 1b share the same risk of contact and spread as permanent residents and will be eligible to be vaccination in SC.

*Unknowns that may change planning

- At present there is no evidence for safety concerns with weakened immune system, but vaccine trials did not include persons with known weakened immune systems. Recommendations for vaccination may change as more data is collected.
- Vaccine safety and efficacy in pregnancy has not been tested. COVID-19 is known to increase poor pregnancy outcomes. In Phase 3 trials a small number of participants became pregnant during the trials, but no outcome information is available.
- In the clinical trials the mRNA vaccines were shown to prevent severe disease. However, it is not known if the mRNA vaccines prevent people from becoming infected. The reported 94-95% efficacy was in the prevention of disease that includes symptoms. Whether vaccination reduces spread remains to be seen.
 - Vaccinating people who are not included in Phase 1b because they
 may spread the virus to others who are vulnerable should not be used
 as a reason for vaccination at this time. Vaccination occurs based on a
 person's phase not their home or other contacts.
- A small number of adolescents age 16-17 were included in Phase 3 Pfizer studies, as per a study update October 2020. FDA and ACIP has voted to recommend vaccine to those age 16 and older. Moderna vaccine is as of January 11, 2021 approved for those age 18 and older

 New findings about additional risks, from vaccine trials, about adverse events, or different indications for vaccines still in development may change planning.

Persons previously infected by COVID-19

• Vaccine is recommended for people previously infected. However, infection again within 90 days is consideredare. When vaccine is limited, vaccinating those infected with SARS-CoV-2 in the previous 90 days can be delayed.

Persons who received monoclonal antibodies infusion for COVID-19

• As per FDA recommendations, vaccination should occur no earlier than 90 days after monoclonal antibody administration.

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